

What is claimed is:

1. A mirror fixing method capable of reducing stress distortion of a surface of a mirror which constitutes an optical system, said stress distortion being generated as a result of fixing said mirror,
wherein a mirror part including a base plate formed with said mirror on one face thereof, is provided with a boss on the other face of said base plate opposite to the face on which said mirror is formed, and
only said boss is fixed, so that said mirror part excluding said boss is not in contact with other members.
2. A mirror fixing method according to claim 1,
wherein a first fixture including a receiving plate which is formed with an opening capable of inserting said boss therein and provided with a screw hole perpendicular to a side wall of said opening, is used, and
said boss which is inserted in the opening of said receiving plate is fixed with a screw from the side using said screw hole.
3. A mirror fixing method according to claim 2,
wherein said boss is a cylindrical shape, and a side wall portion of said opening opposite to the screw hole of said receiving plate is made a V-groove structure, and a side face of said boss is made to abut on said V-groove, to fix said boss in said V-groove with said screw.
4. A mirror fixing method according to claim 3,
wherein a cushion member is installed to be fixed between said boss and a tip portion of said screw.
5. A mirror fixing method according to claim 1,
wherein said first fixture is coupled with a second fixture mountable on a movable stage to constitute a mirror module, and
said mirror module is installed on said movable stage via said second fixture.
6. A mirror fixing method according to claim 5,
wherein said second fixture includes a receiving plate formed with an angle adjusting boss,

a member formed with an opening capable of inserting therein said angle adjusting boss of said receiving plate is provided on said movable stage, and

said mirror module is installed on said movable stage by inserting said angle adjusting boss of said receiving plate in said opening of said member.

7. A mirror fixing method according to claim 6,

wherein said mirror module is installed on said movable stage so as to be rotatable about said angle adjusting boss, and after rotation adjustment of a position of said mirror module relative to a travel shaft of said movable stage, said receiving plate of said second fixture is secured to said movable stage.

8. A mirror fixing method according to claim 7,

wherein an outer peripheral portion of said receiving plate of said second fixture is formed in a shape so as to be positioned on the circumference centered on said angle adjusting boss, and when performing rotation adjustment of said mirror module, said outer peripheral portion of said receiving plate is positioned on the same circumference.

9. A mirror fixing method according to claim 1,

wherein an aspherical mirror used in a variable wavelength dispersion compensator is formed on the one face of said base plate of said mirror part.

10. A mirror fixing method according to claim 9,

wherein, when a boss is provided on the other face of said base plate of said mirror part, the center of said boss is arranged on the central axis of said aspherical mirror.

11. An optical apparatus having an optical system constructed using a mirror, comprising;

a mirror part including a base plate formed with said mirror on one face thereof, and a boss provided on the other face of said base plate opposite to the face on which the mirror is formed; and

a first fixture fixing only said boss, so that said mirror part excluding said boss is not in contact with other members.

12. An optical apparatus according to claim 11,

wherein a first fixture includes a receiving plate which is formed with an opening capable of inserting said boss therein and provided with a screw hole perpendicular to a side wall of said opening, and

said boss which is inserted in the opening of said receiving plate is fixed with a screw from the side using said screw hole.

13. An optical apparatus according to claim 12,
wherein, in said mirror part, said boss is a cylindrical shape, and
a side wall portion of said opening opposite to the screw hole of said receiving plate is made a V-groove structure, and a side face of said boss is made to abut on said V-groove, to fix said boss in said V-groove with said screw.
14. An optical apparatus according to claim 13, further comprising;
a cushion member installed between said boss and a tip portion of said screw.
15. An optical apparatus according to claim 11, further comprising;
a movable stage and a second fixture mountable on said movable stage,
wherein said second fixture and said first fixture are coupled with each other to constitute a mirror module, and
said mirror module is installed on said movable stage via said second fixture.
16. An optical apparatus according to claim 15,
wherein said second fixture includes a receiving plate formed with an angle adjusting boss,
said movable stage is provided with a member formed with an opening capable of inserting therein said angle adjusting boss of said receiving plate, and
said mirror module is installed on said movable stage by inserting said angle adjusting boss of said receiving plate in said opening of said member.
17. An optical apparatus according to claim 16,
wherein said mirror module is installed on said movable stage so as to be rotatable about said angle adjusting boss, and after rotation adjustment of a position of said mirror module relative to a travel shaft of said movable stage, said receiving plate of said second fixture is secured to said movable stage.
18. An optical apparatus according to claim 17,

wherein in said second fixture, said receiving plate includes an outer peripheral portion positioned on the circumference centered on said angle adjusting boss, and when performing rotation adjustment of said mirror module, said outer peripheral portion of said receiving plate is positioned on the same circumference.

19. An optical apparatus according to claim 11,
wherein in said mirror part, an aspherical mirror used in a variable wavelength dispersion compensator is formed on the one face of said base plate.
20. An optical apparatus according to claim 19,
wherein, in said mirror part, the center of said boss is arranged on the central axis of said aspherical mirror.